ARCHEOLOGICAL INVESTIGATION OF THE EAST AND WEST BARRACKS AT FORT FREDERICK STATE PARK, WASHINGTON COUNTY, MARYLAND

PREPARED BY Stephen Israel, M.A.

Sponsored by
the Maryland Bicentennial Commission
Maryland Department of Economic and Community Development
(under contract dated 29 May 1974)

January 1975

#### ABSTRACT

Under the auspices of the Maryland Department of Natural Resources and in joint effort with other state agencies, the State of Maryland is preparing plans for the partial restoration of 18th Century Fort Frederick. The present archeological investigation, sponsored by the Maryland Bicentennial Commission, was designed to assist architectural and historical research in the investigation, documentation and evaluation of the east and west barrack ruins, the subject of the first rebuilding phase.

Excavation showed that the east barrack reflected authentic 18th

Century fort construction. The barrack foundation is both intact and consistent in height and width. Also, all the fireplace footings are H-shaped. In contrast, the west barrack foundation is irregular in height and width, and stone breasts (hearth supports) were added to the H-shaped fireplaces. The difference between the designs of the east and west barrack foundations is attributed to the 1930's Civilian Conservation Corps (CCC) modifications of the west barrack's fireplaces and foundations. At that time all the west barrack fireplaces and foundation walls were altered by capping to a new standard grade.

The excavation revealed a natural sloping terrain laid beneath the present day landscaped cosmetic raised grade. The new grade was placed in the 1930's by the CCC archeological and restoration projects. Evidence was also found of the 18th Century occupation lenses (strata) and surface grade elevations.

No new information was uncovered from archival, architectural or archeological research, to date, regarding the materials, height, or

appearance of the buildings. A 1778 letter describing the Fort buildings in need of repair does not specify the barracks' construction materials or design.

Recommendations were made for preserving the stone foundations and regrading the west barrack. From 50 to 75 percent of the 1756 stone foundation can be preserved in the barracks' reconstruction. Secondly, a partial restoration of the 18th Century sloping grade can be accomplished by lowering the south portion of the west barrack's present grade. Hopefully, these recommendations, if performed, can contribute toward a more authentic restoration of Fort Frederick.

#### **ACKNOWLEDGEMENTS**

The major portion of the funding for the present investigation was provided by the Maryland Bicentennial Commission (Department of Economic and Community Development) through the good offices of General C. E. Hutchin, Jr., Director. The Maryland Geological Survey funded two additional weeks of excavation. I am indebted to the Maryland Park Service for providing part of the field crew. Tyler Bastian has been instrumental in providing assistance from the beginning to the conclusion of the study.

Fort Frederick State Park Superintendent, Paul Sprecher, Rangers
Jim Rogers and Guy Mullinux and Mary Bishop and Tony Blackburn, members
of the Maryland Park Service, were always willing to assist, and to provide the needed field tools and laboratory space in the park.

I owe thanks to Robert Bushnell, Ross Kimmel, Emil Kish, James E. Mallow, and Gerald J. Sword for their cooperation in the field and for sharing with me their knowledge and studies of Fort Frederick.

A special thanks is owed to Joan Hull, Betty Cosans, George Crozier, and Paul Schoenwettier who gave of their free time to assist in the field and countless hours of valuable discussions. The author, as investigator, is indebted to many individual volunteers and members of the field crew whose efforts made the excavation successful:

Julie Allison, Norma Baumgartner, David Chapin, Randy Fishbein, Gerry and Harry Graybill, Bill Lynch, Joseph Martin, Steve Mills, Doug Moore, Cedric Poole, Bob Gox;yJeffb@rozier, Richard Davis, Charlie Dawson, and Ricky Silberstein.

### LIST OF ILLUSTRATIONS

FIGURES	
1	East Barrack Planview pocket 1
2	West Barrack Planview pocket 1
3	East and West Barrack Longitudinal pocket 2 Sections
4	East and West Barrack Transverse pocket 2 Sections
5	Interpretative Barrack Surface Grades pocket 2 and Suggested Contour for Regrading of West Barrack
TABLES	(following page 37)
I	Base Elevations of the East and West Barrack 1756 Foundations
II	Elevations of the East and West Barrack Foundations (1756 stone foundation and 1935 stone and capping modifications)
III	Artifact Distribution
PLATES	(following Tables I, II, and III)
Ia	Initial Excavation of West Barrack 1933-1934. NW Bastion and North Curtain Wall in Background, Looking North.
Ib	Stone Foundation of West Barrack being brought to new grade 1935-1936. North Curtain Wall in Background, Looking North.
II	West Barrack brought to new grade and filled 1935-1936. Photograph taken from within SW Bastion, NW Bastion and North Curtain Wall in Background, Looking North.
IIIa ,	East Barrack before brought to new grade 1934-1935. NE Bastion and East Curtain Wall in Background, Looking North.
IIIb	East Barrack brought to new grade and backfilled 1935-1936, NE Bastion, Wall and East Curtain Wall in Background, Looking NNE
IVa	West Barrack South Foundation Wall showing 1756 foundation, 1935 stone capping and raised fill, Looking North.

#### LIST OF ILLUSTRATIONS (cont'd.)

- IIIb East Barrack brought to new grade and backfilled 1935-1936, NE Bastion, Wall and East Curtain Wall in Background, Looking NNE.
- IVa West Barrack South Foundation Wall showing 1756 foundation, 1935 stone capping and raised fill, Looking North.
- IVb West Barrack Foundation Wall showing 1756 foundation, 1935 stone capping and raised fill, Base of West Curtain Wall in Background, Looking West.
- Va West Barrack Excavated Feature showing 5-foot deep stone and rubble fill lenses, Looking North
- Vb East Barrack South Foundation Wall and Fireplace showing 1756 Foundation, 1935 stone capping and backfill, Looking North.
- VIa East Barrack Elongated insloping Brick Feature, Looking South.
- VIb East and West Barrack Bone Artifacts.
- VIIa East and West Barrack Pewter, Brass, and Lead Artifacts.
- VIIb East and West Barrack Pewter, Brass, Lead, Iron, and Glass Artifacts.
- VIII East and West Barrack Ceramic Artifacts.

# TABLE OF CONTENTS

	Page
ABSTRACT	i-ii
ACKNOWLEDGEMENTS	iii
LIST OF FIGURES	iv
LIST OF TABLES	iv
LIST OF PLATES	iv-v
INTRODUCTION	1-2
EXCAVATION PROCEDURES	3-6
STRATIGRAPHY - EAST BARRACK	7–9
STRATIGRAPHY - WEST BARRACK	10-19
EAST AND WEST BARRACK FOUNDATIONS AND GROUND GRADES	20-27
RESULTS, CONCLUSIONS, AND RECOMMENDATIONS	28-34
REFERENCES CITED	35-37

## INTRODUCTION

Under the auspices of the Maryland Department of Natural Resources (including the Maryland Park Service, the Capital Programs, and the Maryland Geological Survey) and in joint effort with the Maryland Bicentennial Commission, and other state agencies, the State of Maryland has been preparing plans for the reconstruction of the colonial east and west barracks at Fort Frederick (18 WA 20). Architectural research was carried out by Emil Kish, historical research by Ross Kimmel and a program for archeological research was proposed by Tyler Bastian, State Archeologist. In the Spring of 1974, an archeological contract was awarded by the Maryland Bicentennial Commission to the author to investigate, document, and evaluate the east and west barrack sites for architectural informationnneeded for interpretation of the colonial barracks.

The contract developed by Mr. Tyler Bastian and the investigator, involved excavating and evaluating trenches over a period of 4 weeks. However, the trenches in the west barrack area encountered deeper fill than was at first suspected. As a result, the cleaning of the trenches' walls and floors for features required more time than had been anticipated. Additional field work was recommended to clarify further the nature of the barrack foundations and of the Civilian Corps (CCC) restoration work.

The Maryland Geological Survey agreed to fund the excavations for two weeks beyond the original four week contract with the Maryland

Bicentennial Commission. This field work encompassed (1) excavation of the brick and stone features on the parade ground side of both barracks, (2) expose the corners of the 1756 foundations of the west barrack, (3) expand the exploration for porch supportsaandoother ancillary features which may have been adjacent to the barracks and (4) extend one 5 foot wide trench from the west barrack to the west curtain wall.

#### **EXCAVATION PROCEDURES**

Preliminary preparation for the field work was handled by

Tyler Bastian. A short term excavation was anticipated, since the construction of the east and west barracks was expected to begin within a few weeks. This condition necessitated the investigator's immediate attention to the field excavation, permitting only a cursory review of the research manuscripts and photographs.

The principal manuscripts reviewed were Ross M. Kimmel (1973),
Tyler J. Bastian (1970 and 1971), George Schindel (1934), Charles Porter
(1936), Washington Reed (1934), and CCC archeological and reconstruction
projects. A letter dated January 15, 1778, from Samuel Hughes, a
contractor employed by the provincial government in repair work, sheds
light on the barrack's appearance (Hughes 1778).

Samuel Hughes' letter tells us that both barracks were 2 stories high, 120 feet in length and 17 feet in width in the clear, with eight fireplaces and four stacks in each story. The letter goes on to say that the barracks..."wants 32 winders and 24 doors plank'd up...and the upper story a little better closed to the roof." The joists which project six feet over the walls on one side are likely a reference to a pitched porch roof on the parade ground side of each barrack.

In the 1930's the CCC objective was the uncovering of the building foundations and their eventual restoration (Porter 1936:4).

However, the CCC's method of removing the top soil and stripping a few inches of topsoil failed to yield pertinenttarchitectural and archeological evidence. Unsuccessful in locating the original plans of

Fort Frederick, the CCC decided to limit their restoration to capping the original foundation and raising the ground to a new and attractive grade (The Daily Mail, July 16, 1934). The CCC capped the 1756 stone foundations with cut stone, in order to display the Fort ruins on the new grade (Schindel 1934: 3, Porter 1936: 4, and The Daily Mail, July 16, 1934). Furthermore, we learned that the CCC trenched both barrack areas with a series of criss-crossing trenches, 1 foot wide, 2 feet deep, and 8 feet apart (Schidel 1934:2). Artifacts were saved, but inadequate records and storage arrangements allowed most of these colonial implements to become lost.

In July 1971, Tyler Bastian dug a single 30 x 5 foot trench across the width of the east barrack (Fig. 1).heTheptest trench disclosed a shallow, disturbed backfill, 9 to 12 inches deep to the exterior of the barrack. Below the top soil, on the parade ground side, a thin brown loam soil lens (stratum) contained a heavy concentration of brick specks and stone rubble. Abutting the exterior foundation walls were trenches 1 1/2 feet deep and 1 foot wide. The interior fill consisted of two clay types. These clay types are a mottled yellow, orange, and brown gravelly clay and a red gravelly clay 9 to 15 inches deep.

Review of the above Fort Frederick manuscripts, maps and on the site examinations raised a number of questions which the present field investigation attempted to explore. How did the CCC excavation and landscaping projects effect the 1756 foundations and former 18th Century occupation lenses (strata)? What ancillary architectural features and structures remain, such as the porch supports (Schindel 1934: 3)? Why are the two similar and contemporaneous barrack foundations different as reconstructed by the CCC? Why are the 1934 and the 1973 topographic

surveys of Fort Frederick contradictory? These questions were raised in order to focus attention on what areas this excavation could add to the general understanding of the barracks.

The excavation began June 24 and continued through August 4th.

Three trenches: A, B, and C were opened by hand in the first week, across the width of the west barrack (Fig. 2). Each trench extended 30 feet in length and 5 feet in width, but later were enlarged.

In the second week, a trench was mechanically dug through the north-south axis of each barrack: Backhoe Trench B extending 145 feet through the east barrack and Backhoe Trench A extending 141 feet through the west barrack (Figs. 1 & 2, a-a, a'-a', and d-d). In addition, five more trenches were opened on the parade ground side of the west barrack area (Backhoe Trenches A-8) through 12) and four more in the east barrack (Backhoe Trenches B-8 through 11). Time did not permit the cleaning of Backhoe Trenches A-8, A-10, B-8, B-9, B-10, or B-11. In the field, Backhoe Trenches A & B were identified as Graded Strips A & B.

The remaining five weeks were spent in enlarging, cleaning, mapping, drawing, photographing, and evaluating the trenches and architectural features. The backhoe trenches extended down to the undisturbed beigetan sandy clay; 10 to 12 inches in the east barrack and 30 to 36 inches in the west barrack and 56 inches in Trenches A-6 and H (Figs. 3 & 4).

Shovels were used to dig Trenches, A, B, C, D, E, F, G, and H.

The disturbed soils were removed as rapidly as possible. Mechanical equipment (a Case 350 backhoe with a 36-inch wide bucket) was employed to

remove the disturbed lenses in Backhoe Trenches A-1 through 12 and B-1 through 11. Thereafter, the trench floors and walls were carefully checked for interpretive stratigraphy, barrack architecture and evidence of building materials. Mortar, soil, and brick samples were taken and bagged, anticipating their usefulness in future studies. All the artifacts and field notes were deposited with the Maryland Geological Survey with the exception of a 6 lb. iron cannon ball left with Superintendent Sprecher at Fort Frederick State Park.

The writer returned to Fort Frederick during the weekend of October 19th and 20th, to excavate two fireplace footings in the west barrack (Figs. 2, 3, and 4). In addition, a thick cover of moss was found growing on the lower lenses of the opened trenches. This moss is believed to reflect the high organic content of former occupation lenses (strata). The moss was absent in the upper gravelly clay fill.

#### STRATIGRAPHY

#### EAST BARRACK

Backhoe Trench B-1 through 7 and Trenches E and F revealed shallow fill soil lenses characterized the whole north-south length of the barrack (Figs. 1 & 3, a-a, a'-a', and c-c). In the exterior Trenches B-1 and 7 the disturbed soil lenses appeared 6, 9, and 12 inches deep, dropping to 18 to 24 inches where trenches were found abutting the barrack foundations. In Backhoe Trench B-7, the present top soil laid directly on the undisturbed mottled yellow, orange, and brown gravelly clay and red gravelly clay fill laid sharply upon a thin black humus lens 12 inches below the present grade (Figs. 3, a-a; Plate Vb). In contrast, this black humus lens blended with the undisturbed beige-tan clay beneath, indicating a prolonged exposure, e.g., a former top soil.

Within the interior of the barrack the disturbed soils were 15 to 18 inches deep and consisted of mottled yellow, orange, and brown gravelly clay and red gravelly clay. Their sharp base demarcation denotes a rapid filling. Our archeological trenches abutting the fireplace footings disclosed modern cement sloppily placed over the entire face of the exposed footings. These sloppy cement slabs are the same 15 to 18 inch depth as are the fill lenses. Artifact recovery in these disturbed lenses, although scattered, did reflect the 18th Century (Table III).

Several previously excavated trenches were uncovered in the exterior Backhoe Trenches B-1 and 7, Trench E, and in Bastian's 1971 trench (Figs.

1, 3, and 4; a-a, a'a', b-b, and c-c; Plate Vb). These 1 foot wide trenches were 10 to 18 inches deep, and filled with a mixed assortment of former top soils, red gravelly clays, and brown loams. These trenches were likely dug by the CCC in an attempt to trace the outline of the barrack foundation. CCC photographs (copies on file in the Maryland Geological Survey, negative #485B and 487A) show comparable CCC exploratory trenches abutting the Officer's barrack. The 1756 builder's trench appears to be either non-existent or obliterated by the 1930's CCC excavation. The only artifacts found in these narrow trenches were a 1940 U.S. penny, an earthenware sherd, 2 square nails, and a glass vial base.

In Trenches E and F, a slightly meandering elongated brick feature was re-exposed having been earlier detected in the 1930's (Reed 1934).

This brick feature is 10 feet long and two bricks abreast. The bricks in each row laid end to end and sloped toward each other so that the transverse cross section of the top of the feature forms a broad V. The two rows are 1 1/2 inches apart. Several bricks exhibit early mortar binding. Most, however, are laid in position without a mortar agent.

Washington Reed, Jr., architect, inferred that this east barrack brick feature, and its west barrack counter-part (pp. 19 & 20), were brick drains. Built 5 1/2 to 6 1/2 feet out from the barrack, "the drains" were located on the edge of porch roof (Hughes 1778). There is a discrepancy between the December 1934 survey reading of 473.15 and the July 1973 survey elevation of 474.3 for this east barrack brick feature. These two different elevations are unresolved, in as much as these tapered bricks appear to be in their authentic 18th Century position 3 inches below the present grade.

In Backhoe Trench B-4, a 9  $\times$  9 inch post hole was found. Below the disturbed fill the post hole is 11 inches deep and tapers to a 4 inch diameter. The post hole noted in the 1971 test trench was not reopened (Fig. 1; Bastian 1971).

## STRATIGRAPHY

#### WEST BARRACK

Trenches A, B, C, D, and Backhoe Trenches A-1 through 12 revealed a fill 15 to 30 inches deep (Figs. 2, 3, & 4; Plate IVa). On the exterior of the long sides of the barrack, the top soil and underlying yellow, orange, and brown gravelly clay and red gravelly clay lenses cover a brown sandy loam and shale lens. The latter soil lens and the 1756 stone foundation denote contemporaneity, for the lens abutts the stone wall and its high organic content typifies an occupation lens. Scattered cultural refuse was recovered in this brown sandy loam and shale lens (Table III). Beneath the above disturbed and fill soil lenses lies an undisturbed beige-tan sandy clay subsoil.

Inside the barrack foundations, the CCC stripped the soil down to the base of the fireplace stone breasts (hearth supports) (Figs. 3 & 4). Yet the bottom of the fill is 8 to 10 inches above the base of the H-shapped fireplace footings and barrack foundation footings which appear to be submerged in the undisturbed beige-tan sandy clay subsoil.

Trench A measured 30 x 5 feet and was dug across the west barrack and later extended to the west curtain wall (Figs. 2 & 4, e-e). Below the top soil this trench contained 18 to 25 inches of yellow, orange, and brown gravelly clay and red gravelly clay. Also, this clay is generally clean and free of debris. The clay lies sharply upon a brown sandy loam

and shale lens 15 to 18 inches in depth on the parade ground side, and 27 inches on the curtain wall side.

Trench A was extended to the west curtain wall to explore for catwalk posts, latrine trenches, and log retaining wall posts which would have been present if there was an earthen wall 16 to 17 feet thick (Bastian 1970: 4 and Kimmel 1973: 17-18). However, no evidence was found delineating these conjectured features of the Fort. Instead, two CCC trenches were found 1 foot wide, 1 1/2 feet deep, 7 1/2 feet apart and at a depth of 36 to 45 inches (Figs. 2 & 4, e-e). These two trenches are parallel to the curtain wall. Whether these trenches were dug by the CCC or merely cleared of log retaining wall posts was not described in the CCC records.

Photographs taken of the Trench A floor at 36 inches revealed a mottled brown clay loam lens approximately 24 inches square. This thin square lens (possibly made from an impression of an object) overlies a narrow CCC trench but because of their similar backfill soil matrix, contemporaneity is conjectured (Fig. 2).

A third CCC trench extended approximately at a right angle from the west foundation wall to within 3 1/2 feet from the west curtain wall.

This 20 foot long trench terminated at a black humus and crushed mortar lens abutting the curtain wall and extending 3 1/2 feet out from the wall.

This 8 inch thick lens contained a single post-Civil War period glass bottle base. Also, the top elevation of this lens matches the base of the capped stone of the adjacent west barrack foundation, possibly denoting the pre-1930 ground grade.

A 1-foot wide, 13 inch deep trench was found abutting the barrack foundation west exterior face. No artifacts were found other than brick and mortar specks. It is suspected that, in the 1930's, the CCC trenched the exterior face of the foundation. On the interior side of the barrack foundation the CCC deposited a thick stone and mortar rubble lens abutting both the 1756 wall and 1935 stone capping (Fig. 4, e-e; Plate IVb).

On the parade dground side a thin black humus lens blends with the undisturbed beige-tan clay 21 to 24 inches below the present grade, indicating a prolong exposure and development of a former top soil. This thin black humus lens is absent on the curtain wall side. No artifacts were recovered from this thin lens. On the curtain wall side, a brown sandy loam, shale, and gravel lens 24 to 30 inches thick contained a scattering of 18th Century refuse of earthenware rimsherds, glass bottle sherds, and square nails (Table III).

Trenches A and B exhibit comparable soil strata. There is a general uniformity in Trenches A, B, and C with their thin black humus and brown sandy loam and shale lenses on the parade ground side and a thick brown sandy loam, shale, and gravel lens on the curtain wall side.

Trench B was dug 30 x 5 feet across the west barrack; later extended 6 feet to uncover the south face of a rectangular stone foundation east of the west barrack (Figs. 2 & 4, f-f). A CCC trench runs beneath the stone feature. This trench is below the gravelly clay fill.

Also, no relationships or clues to the rectangular stone foundations' 18th Century origin were found. The foundation seems to have been completely rebuilt in the 1930's with modern cement and lying in undisturbed clay subsoil.

Trench C measured 33 1/2 x 5 feet and contained over 100 square nails and bone refuse 6 feet east of the foundation wall. The nails occurred singly and in clusters of 2 to 6. This concentration of square nails and bone refuse, 14 to 17 inches deep in a brown sandy loam, shale, and gravel lens, is not fully understood. No intrusion or dip in the lenses was noted. The CCC may not have disturbed this particular area. On the west curtain wall side a trench within a trench was disclosed abutting the foundation exterior wall (Fig. 4, g-g). The absence of artifact associations complicates its explanation. Possibly the CCC intrusive trench did not abutt the original foundation in this area, leaving a small remnant of the 18th Century builder's trench.

Backhoe Trench A-1 dug south of the barrack measured 11 x 3 feet (Figs. 2 & 3, d-d). Beneath the 7 to 9 inch deep topsoil a 20 to 23 inch deep orange, yellow, and brown clay and a red gravelly clay was found. The sharp base demarcations indicate rapid filling. See (Plate IVa, Fig. 3, d-d, and Table II) for conjectured depth of CCC excavation and subsequent 1930's 25-inch stone capping laid upon the original 17-inch high foundation wall.

A thin black humus lens 1 to 2 inches thick and 36 inches deep contained wine bottle glass, square and wire nails, and a brass strip. Its blending base demarcation with the undisturbed beige-tan clay below denotes an extended period of exposure to the weather.

Abutting the south foundation is a thicker black humus lens dipping down 9 inches. Its sharp demarcation and undulating nature indicates a rapid deposition.

Backhoe Trench A-2 dug adjacent to the south foundation measured 8 x 3 feet. Beneath a 6 inch top soil, 9 to 18 inch yellow, orange, and brown gravelly clay and red gravelly clay fills, a stone and mortar rubble lens was found (Figs. 2 & 3, d-d). This rubble lens abutts the CCC capping of the south foundation wall. Lying on the undisturbed beige-tan clay subsoil is a 1 to 2 inch thick deposition (fill). A scaffold hole measuring 2 x 1 inch found at a 36 inch depth is evidence of the 1930's CCC foundation restoration. (See Plate Ib which shows wooden scaffolding in the south end of the west barrack).

Backhoe Trench A-3 measured 19 1/2 x 3 feet. Beneath a 6 inch top soil 23 to 29 inches of yellow, orange, and brown gravelly clay, red gravelly clay, and stone and mortar rubble lenses were found lying upon a black humus lens 1 to 2 inches thick. The latter lens thickened to 6 inches at the north end of the trench. The top soil contained artifacts which were mainly 18th Century, except for a few wire nails and expended cartridge shells (Table III). The black humus lens at the bottom of the trench exhibited sharp edges and contained iron fragments, brick and mortar specks, square nails, a pewter knife handle, brass shoe buckles, queensware,,saltglaze, flat glass bottle sherds, and kaolin pipe stem fragments suggesting an 18th Century context.

Backhoe Trench A-4 was dug 20 x 3 feet. The soils between the two fireplace footings exhibit disturbed lenses to a depth of 27 inches. The fill stratification is identical to that of Backhoe Trench A-3. At the base of the trench, two small pockets of black humus were disclosed. Each was filled with brick and mortar specks. The black humus lens tapers

for it is present on the west face of the trench, but absent on the east face (Fig. 3, d-d). Artifacts from the top soil include a 22 cartridge, and wire and square nails. Refuse from the lower black humus lens, 24 to 27 inches beneath the surface, reflects an 18th Century contexts including bone buttons, bone button plaque, earthenware sherds, glass bottle sherds, kaolin pipe stems, and iron fragments.

Backhoe Trench A-5 was dug 20 x 3 feet. Beneath the top soil, a 24 to 33 inch thick disturbed yellow, orange, and brown gravelly clay and a brown clay loam, shale, and gravel were found. This trench lacked the black humus lens and ccultural refuse typical of the west barrack interrior trench strata. The sharp demarcation of the base of the disturbed fill denotes a rapid deposition.

Backhoe Trench A-6 dug adjacent to the north foundation measured 8 1/2 x 3 feet (Figs. 2, 3, & 4; d-d). Below a 6 inch thick top soil were found a deep lens of yellow, orange, and brown gravelly clay 18 to 23 inches thick, overlying a red gravelly clay and a 30 inch thick gravelly brown, shale, and sandy clay lens. A sharp demarcation of these lenses implies a rapid deposition. Only a single square nail and a bottle glass fragment were retrieved in cleaning the walls of this mechanically dug trench.

Trench H was dug at right angles to the Backhoe Trench A-6
to expose the east and west dimensions of a 56 inch deep excavated feature described below. Trench H contained a 6 to 9 inch top soil and a 22-inch thick yellow, orange, and brown gravelly clay lens lying sharply

upon a l foot thick black humus, stone and brick rubble lens with a concentration of 18th Century refuse (Plate Vb; Table III). This refuse and rubble lens overlaid a one-foot thick compact yellow, tan, sandy clay fill containing scattered refuse.

The excavated feature has a flat floor 8 x 8 feet across which lies on a compacted brownish pale, yellow, and light gray clay in the west half of Trench H. The wast half of the feature was destroyed in the digging of the initial backhoe trench. The remaining lenses rise upward to a shallow shelf along the east foundation wall (Fig. 4, h-h). The excavated feature extended down 19 inches below the west foundation wall. The rock rubble in the feature's fill suggests that it is rubble derived from a fallen foundation. One such wall is the adjacent north foundation wall which apparently the CCC completely rebuilt.

Backhoe Trench A-7 was dug north of the barracks and measured 11 1/2 x 3 feet. Beneath the topssoil the disturbed lenses extended 18 to 21 inches below today's grade. A 1 1/2 inch thick modern cement slab was uncovered 13 inches below grade. The top of the brown, gravelly lens of shale and sandy loam is uneaven and mayyreflect the CCC stripping. A black humus lens 1 to 3 inches thick lies on the undisturbed beige-tan clay lens. Its blending demarcation denotes an extended exposure.

The flat cement slab might have been a mixing platform used by the CCC. Six feet north of the north foundation wall, a shallow pocket of mottled brown clay loam and beige-tan clay measuring 10 x 12 inches in diameter and 3 inches deep was uncovered at the bottom of the disturbed lenses. The feature's uneven bottom suggests a plant bed.

Backhoe Trench A-9 was dug in two portions, 11 1/2 x 3 feet to the north and 10 1/4 x 3 feet to the south of the brick octagonal raised platform (Fig. 2, i-i). The CCC records indicated that they uncovered a 6 x 6 foot diamond-shaped brick platform (Reed 1934 archaeological plan), but the present structure, which the CCC presumably built, is a 15-inch high cement and stone support capped with a brick octagonal-shaped platform. Extending south from the platform is a 6 1/2 foot long brick feature which lies on a 24-inch high cement support. This extension is comprised of three parallel rows with the bricks in each row laid end to end. The tops of the bricks in the outer two rows slope.

A series of eight 2 x 1 inch scaffold holes were uncovered 24 to 27 inches below the surface where they penetrated the undisturbed beige-tan clay subsoil. The scaffold holes were found in alignment with the octagonal brick and elongated brick feature (Fig. 2) and represent the CCC restoration wooden props for raising the 18th Century stone and brick features.

The west face elevations of Trench A-9 reveal disturbed lenses dipping down 15 to 21 inches on both sides of the octagonal brick platform. The blending of the brick humus soil lenses with the undisturbed beigetan clay beneath implies that the depressions were there prior to the 1930's, and that the CCC conceivably raised the brick platform with out disturbing the adjacent soils. A loose mortar, brick, and rock rubble lens in the southern end of the trench contained a clasp iron knife and a 1723 English halfpenny.

Another trench is indicated by a 1 foot wide x 1 1/2 foot deep lens in the west elevation. Its shallow depth below today's top soil implies a post-CCC date (Fig. 4, i-i). Yet the black humus lens below blends with the undisturbed clay suggesting a former ground grade. Whatever the explanation for this narrow trench, it is difficult to believe that the CCC didn't strip this location.

Trench D was dug to obtain a front elevation of the 6 1/2 foot elongated brick feature. The north wall profile shows the raised brick feature mounted on a 24-inch high mortar support. The upper half of which was poured into a wooden mold and the rough lower half poured into an open trench (Fig. 4, j-j). Six feet to the east is a concentration of crushed brick previously noted in the CCC excavation (Reed 1934). These shallow pockets of crushed brick vary from 9 to 14 inches deep. The disturbed soils in the north wall elevation are 15 inches thick.

Backhoe Trench A-11 measured 10 1/2 x 4 feet, was dug on the parade ground side of the west barrack to check for porch supports. Beneath the top soil and yellow, orange, and brown gravelly clay, a 9 to 15 inch thick mottled beige-tan clay and black humus rubble pocket was found 21 to 35 inches deep (Fig. 4, k-k). The sharp demarcation of this lens implies a rapid deposition. The rubble pocket fill may mark the approximate location of the loose stone cited in the 1934 archaeological plan. Artifacts retrieved from this lens included a saltglaze tea pot lid sherd, delftware sherd, wine bottle sherds, and square nails. A black humus lens in the west half of the south face blends with the mottled soil beneath, complicating interpretation, because the east half shows a sharp demarcation.

Backhoe Trench A-12 was dug in the parade ground area and measured 12 x 4 feet (Figs. 2 & 4, m-m). The red gravelly clay fill demarcation is sharp. Abutting this fill lens is a 36 x 18 x 30 inch deep stone foundation, whose modern cement testifies to its complete rebuilding in the 1930's. It is thought to be a stair support (Kish 1974: #2 drawing of Fort Frederick barracks). A 30 to 36 inch deep lens lying on the undisturbed beige-tan clay subsoil may be comparable to the lower mottled rubble lens noted in Backhoe Trench A-11. This lens contained only a delft plate rimsherd, and begins 6 feet out from the barracks wall. A post hole 11 x 9 inches in diameter and 3 inches deep was found on the floor of the undisturbed beige-tan clay. The post hole is slightly off-set from the barrack's southeast corner.

A thin black humus lens abutts the east wall of the barracks and blends with the undisturbed beige-tan clay beneath. Our partial excavation of the mottled black humus and tan sandy clay rubble lens in Trench A-12 area made its 18, 19, or 20th Century association uncertain. This black humus lens was one of the many lenses covered with the moss (see page 6).

1

### EAST AND WEST BARRACK FOUNDATIONS AND GROUND GRADES

In the 1930's the Civilian Conservation Corps (CCC) uncovered the east and west barrack stone foundations and, as shown by our research, subsequently modified the west barrack foundation. These barrack foundations were only briefly mentioned by CCC investigators (Schindel 1934: 3; Porter 1936: 4-6; The Daily Mail, July 16 and August 14, 1934 and Reed's archaeological plan). Samuel Hughes in his 1778 letter, describes the barracks as being 2 stories high, 120 feet in length and 17 feet in width in the clear, with 4 stacks and 8 fireplaces in each story.

Prior to our excavation, the most apparent differences between the east and west barrack foundations are the shape of the fireplace footings. Those of the east barrack are H-shaped and measure 6-6 1/2 x 8 1/2 feet in planview. The west barrack fireplaces with their stone breasts (hearth supports) measure 9 1/2 x 8 feet (Figs. 1 & 2).

Excavation of 2 west barrack fireplace footings showed that the stone breasts were added in the 1930's and built with modern cement, and are 6 to 8 inches higher at the base than the 1756 H-shaped fireplace footings. Also, the stone breasts are not attached to the latter below the CCC 15 inch deep capping.

Further differences between the east and west barracks CCC modifications include the west barrack uneven thickness of the stone capping varying 15 to 27 inches in height, 21 to 30 inches in irregular width,

and the completely rebuilt north foundation wall (Table II; Plates IVa and IVb). In contrast, the thickness and width of the capping on the east barrack was more uniform.

The difference in construction of the two elongated brick features or drains, on the parade ground side of both barracks is not understood. The east barrack feature is ten feet long today with two rows of inward sloping brick which appear to be in situ (Plate VIa), whereas, the brick feature adjacent to the west barrack is 6 1/2 feet long and consists of three bricks abreast with a gentle inward slope and lying on a 24 inch high modern cement support. Betty Cosans (personal communication) suggests that if these brick features were originally drains, they were likely supports to a wooden trough.

The CCC also uncovered a diamond-shaped brick feature on the parade ground side of the west barrack (Reed 1934). Without specifying why, the CCC capped it with an octagonal-shaped brick cover. This brick platform lies on a stone and cement support 15 inches high. Whether the former diamond-shaped platform was originally 15 inches below today's octagonal platform could not be determined; nor could its purpose be established. The CCC stripping destroyed the original stratigraphy.

Two types of mortar were noted throughout the barracks excavation. A soft, earth, sand, and lime matrix was found on the lower foundations and disturbed fill lenses and a modern gray cement was found on the stone capping on the east and west barrack foundations, fireplace footings and ancillary features associated with the capping, landscapping, and modification activities of the 1930's.

The east barrack foundation is less modified, more intact and in keeping with the authentic 18th Century fort construction. The foundations are consistent in widths, 18 to 21 inches vertical (straight walls), and maintain a constant 13 inch height (Table II). The four, 6-6 1/2 x 8 1/2 foot fireplace footings are H-shaped. Also, it is uncertain whether the 1935 seven-inch stone capping on the foundation was merely mended with cement or added at this time.

Reed, in his December 1934 archaeological plan, briefly illustrates a "typical section" of the east barrack, including the 7-inch stone capping. Questions are raised regarding the condition in which the CCC found the east and west barrack foundations. Also, was the east barrack foundation more intact than the west barrack?

An identical construction can be discerned for the west barrack before the CCC modified the foundations. The barrack's contemporaneity is pointed to by (1) the similar dimensions, (2) the 4 H-shaped fireplace footings (measuring 7 x 8 feet in planview), and (3) its vertical wall foundations 12 to 23 inches in height below the capping. Like the east barrack, the base of the west barrack slopes upward 1 foot from south to north. Only the north foundation wall of the west barrack deviates from this pattern, being 2 feet above the south foundation wall (Fig. 3, d-d).

In the north end of the west barrack, a 5 foot deep, excavated feature was exposed and excavated. The feature has a 8 x 8 foot flat floor with vertical walls except for the sloping east wall (Trench H, hah and

Backhoe Trench 1-6, d-d). The flat floor is 19 inches below the base of the original west foundation wall and 28 inches below the modern cement slab. The floor is a compact brownish pale, yellow, and light gray clay.

The feature's lower lenses contained many loose building stones and late 18th Century refuse. A 1780-1810 deposition date is surmised. Is it plausible that the CCC found no standing north foundation wall because it had collapsed?

At the south end of the west barrack, the 1756 foundation is 17 inches high and 12 inches wide. The 1930's stone capping, above, is 25 inches high and 24 inches wide at the base, tapering to the uniform 17 to 18 inch top width (Fig. 3). The capping of the east and west walls of the west barrack vary from 18 to 24 inches in width with the stone capping frequently irregular and not closely aligned with the 1756 vertical walls.

The excavations found a few scattered post holes on the exterior of the barracks (Backhoe Trench A-7, A-12, D, and B-4; Figs. 1 & 2). The scaffold holes were created by the CCC 1930's restoration work (Fig. 2). Evidence of original building material, such as chinking and iron spikes, was not found. However, following the extensive 1930's trenching and stripping, the absence of such evidence in 1974 cannot be a convincing factor in determining the barrack building materials.

Flat glass sherds were minimal, and were concentrated in the excavated feature of Trench H. Square nails were widely scattered throughout the disturbed excavated lenses, except in Trench C, parade ground side, where some 100 nails were found in a brown sandy loam, shale, and gravel

lens, 14 to 17 inch depths, in clusters of 2, 3, 4, 5, or 6. Further evidence that this was an undisturbed 18th Century occupation lens is the artifact clustering of the square nails and bone refuse (Table III).

The present grade surrounding the west barrack was laid in 19351937. Re-establishment of the 18th Century grade is problematical because of the extensive trenching and stripping by the CCC. The 1974 trench
elevations and CCC photographs attest to the new 1930's cosmetic grade
denoting a 18 to 30 inch raised fill. Thus, the west barrack 18th Century
grade is conjectured to have been 15 inches lower at the north end, to
30 inches lower at the south end of the barrack (Figs. 3 & 5). In sum
the combined evidence supporting this opinion encompasses the depth of
the stone capping and fill, the sharp demarcations of the fill lenses denoting rapid deposition, CCC photographs, and the contrasting 1934 and
1973 topographic surveys. The difference in grade is clearly depicted in
the CCC photographs showing the early and final stages of CCC alteration
activities of the west barrack (Plates Ia, Ib, and II).

Like its foundation, the ground grade of the east barrack appears less modified than that of the west barrack. The exact 18th Century level and grade are not known but they apparently approximate today's grade (Fig. 5). This view is supported by the shallowness of (1) the disturbed soils surrounding the east barrack (Figs. 3 & 4, a-a, b-b, and c-c), (2) the elongated brick feature (Plate VIa), and (3) the cement platform surrounding the well, said to have been built in the early 1930's.

Nevertheless, Fox & Associates' 1973 survey assigned a 15 inch higher elevation to the overall east barrack grade, in contrast to the 1934 survey. The evidence shown in 1974 does not support this higher grade.

Possibly the CCC trenches and stripping activities destroyed the explanation, but for reasons discussed above, the author senses more validity in theceast barrack's unmodified grade. The 1934 and 1973 topographic elevations conceivably have a certain degree of error. Also, the 1934 elevations possibly are less accurate following the CCC alterations. Only in the southeast corner of the west barrack do the 1934 and 1973 survey elevations match: the 1934 elevation is 471.2 and the 1973 is 473.3 (Table II). The 2.1 tenths difference is in the stone capping height. In the northeast and northwest corners of the west barrack and all corners

of the east barrack, there are differences of more than one foot. The

east barrack top elevations are recorded in 1934 as 473.0 and 473.7 and

the 1973 elevations are 474.5 and 475.0 respectfully. The height of the

CCC capping does not account for these differences.

Further uncertainties are in the height of the two northernmost west barrack fireplaces. The 1934 top elevations are 479.1 and 474.2 and the 1973 both are 473.6. the 479.1 elevation given for the northern fireplace footing is assumed to be an error because early photographs do not reveal relief of such magnitude (Reed 1934). The elevations of the two southern fireplace footings match: 473.1 and 473.5 in 1934 and 473.4 and 473.5 in 1973.

The possibility of an uneven grade along the longitudinal axis of the west barrack is suggested in photographs taken during the CCC excavations (copies on file in the Maryland Geological Survey, negative #482, 484A, 484B, 485A, and Plate Ia). The above photographs suggest that the west barrack fireplaces may have protruded slightly above the pre-1930's ground grade. Excavation of two west barrack fireplace footings (Fig.2)

showed this to be true. The two exposed fireplaces show the original 1756 footings 1 foot higher than the adjacent barrack walls beneath the cosmetic stone capping.

Evidence of occupation lenses around the east barrack have been destroyed, except possibly for the stratigraphy south of the barrack in Backhoe Trench B-1. In the area of the west barrack occupational-like lenses were found to the east and west sides of the barrack. These latter lenses of brown sandy loam, shale, and gravel reveal a scattering of 18th Century refuse (Table III). What is not known is how much of the top of the 18th Century occupation lens did the CCC strip off.

The base elevations of the foundations are our most consistent, intact, and reliable elevations to work with inedetermining the 18th Century foundation and ground grades. While the east barrack 1756 stone foundation is consistently 13 inches high the west barrack 1756 foundation varies from 7 to 23 inches in height. The foundations of both the east and west barracks slope upward one foot at the base from south to north (Tables 1 & 2).

Today's east and west barrack ground grade obtained from Fox & Associates, Inc. Survey, July 1973

	W Barrack	,	E Barrack
N. Fndn Wall-	474.0		475.0
S. Fndn Wall-	473.2		474.4

# Elevations of intact bases of 1756 foundations obtained August 1974

		W Barrack	E Barrack
N.	Fndn Wall-	471.11 (?)	473.25
s.	Fndn Wall-	469.9	472.9

# Conjectured 18th Century Ground Grade obtained August 1974

		W Barrack	E Barrack
N. Fndn Wall-		473.3	475.0
S. Fndn Wall-	?	471.6	474.5

A substantial sloping terrain is suggested in studying the uneven CCC fill, stone capping, CCC photographs, and the 1974 archeological trench elevations. The south foundation base of the west barrack is 3 feet lower than the south foundation base of the east barrack 469.9:
472.9 (Table I). Similarly the north foundation base of the west barrack is 2 feet lower than the east barrack north foundation base 471.11: 473.25.
Another contemporary French and Indian War frontier fort, Fort Ligonier, located 80 miles to the northwest of Fort Grederick was also built on a slope in hilly terrain (Grimm 1970:7).

#### RESULTS, CONCLUSIONS, AND RECOMMENDATIONS

Results The project's general objective was to seek information that would help assure the authentic reconstruction and interpretation of the east and west barracks. The June-July 1974 excavation uncovered the 1756 barrack foundations, fireplace footings, and 4 ancillary foundations. Barrack and ground grade elevations were defined along with remnants of the 18th Century occupation lens.

No new information was uncovered from archival, architectural, or archeological collaborated research to date, regarding the building materials (stone, hewn log, planked, or frame), appearance, height, or how roofed. Hughes's 1778 letter describing the fort buildings in need of repair, does not specify the barrack's construction materials or designs. Hughes's, however, does imply plank construction as he writes "...which will be cheaper than laying plank over head..." Also Hughes's description of the barrack's design is limited to describing the barracks as being 2 stories high, with 32 windows, 24 doors, and with 4 stacks of chimneys and 8 fireplaces in each story.

A more complete understanding of the Civilian Conservation Corps (CCC) 1930's excavation and restoration activities was achieved. The CCC was principally interested in locating building foundations. Unable to locate original plans of the Fort and its interior buildings, the CCC decided to limit their restoration to stabilizing, landscaping, and capping the barrack foundations in order to display the buildings' exact locations, encourage tourist imagination, and create an attractive fort and state park (The Daily Mail, July 16, and August 14, 1934).

The stone foundations for porch supports, reported by Schindel (1934:3), were not found. Sherds of flat glass were found. The use of this flat glass can be attributed to either window glass, snuff, gin, or Dutch bottles.

The CCC apparently did not recognize the disturbed area in the north end of the west barrack. The 1974 investigation excavated an 18th Century excavated feature or storage area measuring 8 x 8 feet square and 5 feet deep. Its 1780 to 1810 conjectured fill date is based on its 18th Century refuse fill content (Figs. 2 & 4, h-h; Table III).

Conclusions The east barrack seems more in keeping with authentic 18th Century fort construction. This barrack is less modified and more intact than the west barrack. Moreover, the east barrack fire-place footings are all H-shaped and the foundation widths and heights are aligned and consistent (See pages 23-26).

The differences between the east and west barracks are attributed to the CCC restoration and modification activities. In capping the west barrack foundations and fireplace footings, the CCC made modifications in the appearance of the foundation. These changes resulted in off-set and irregular stone capping dimensions, revised fireplace shape and dimensions, a rebuilt north foundation wall, and a new ground grade. The stone breasts (hearth supports) on the north and south face of the west barrack fireplaces were added in the 1930's. Beneath the fireplace capping, the stone breasts are faced with modern cement, and are slightly higher at the base than are the original H-shaped fireplace footings and adjacent original foundation wall. Similar foundation modifications are observed in the stone stair support, rectangular stone platform, elongated brick feature, and the

diamond-shaped platform.

The lenses of raised fill in the area of the west barrack are

15 to 30 inches deep, comparable to the 15 to 27 inch stone capping height.

The deepest fill and capping appears at the south end of the west barrack.

This raised fill is made up of a clean, little disturbed, mottled yellow, orange, and brown gravelly clay and a red gravelly clay. Shallow remnants of the 18th Century occupation lens remain beneath the fill lenses in the parade ground and curtain wall sides of the west barrack. Further support of the above 18th Century occupational lens is the presence of scattered 18th Century refuse and green moss. The latter commonly grows upon organic materials associated with former occupational or refuse lenses (See page 6).

This thin black humus occupational lens lying on the beige-tan undisturbed clay is found only on the parade ground side of the west barrack. The same black humus is found in the west barrack north and south trenches but is less defined. It is absent on the curtain wall side in the archeological trenches.

The only trench south of the west barrack Backhoe Trench A-1, exposed a thick black humus lens lying on the beige-tan undisturbed clay subsoil. Its cultural association is uncertain. Possibly this thick black humus lenses was disturbed or deposited in the 1930's.

This author also concludes that there is more uniformity between the original east and west barrack foundations in size, design, and alignment, than the CCC modifications portray. The work of the CCC has obsured these similarities.

Recommendations In the forthcoming reconstruction of the east and west barracks, it is my viewpoint that the new barrack buildings should retain as much of the 1756 foundation as is feasible. Thus, I recommend that 50 to 75 percent of the 1756 barrack foundations be preserved. If for budgetary reasons these preserved foundations cannot be prepared for display at the present time, they can be covered and exposed for display at a later date.

A partial restoration of the 18th Century natural sloping grade is suggested. In lowering the south end of the west barrack by 20 inches the effect would create the natural and original terrain setting of the barracks (Fig. 5) (Robert Bushnell and Emil Kish, personal Communication). I do not advise removing all 30 inches of the 1930's cosmetic raised fill. Instead, it would be wise to leave a 6 inch cushion at the base of the CCC fill. This would prevent further destruction of the archeological evidence and insure maximum recovery of information from future archeological investigations. It is also advisable to restrict the regrading to the immediate area of the west barrack. Along with regrading, a drainage system should be installed in the southwest portion of the Fort.

Still unresolved are the elevations of the west barrack fireplace footings: south to north, 473.1, 473.6, 473.3, and 479.1 feet noted in Reed's 1934 archaeological plan. Excavation showed that the 1756 fireplace footings are one-foot higher than the adjacent barrack foundations ( See page 26.) Several CCC photographs taken before the foundation was capped also suggest these higher fireplace elevations ( copies on file in Maryland

Geological Survey, negative N 482, 484A, and 484B). Another photograph (xerox copy just received) is in George Schindel's 1934 report; page 2 top paragraph, which caption reads, "subgrading and construction of the east barrack." Modern prints of these 1934-1937 black and white negatives possibly would give a clearer historical documentation, on the CCC modifications and new clues to the architecture, fireplace, and barrack elevations. However, these CCC negatives have yet to be found.

# REFERENCES CITED

- Bastian, Tyler J.
  - 1970 Tentative Program For Archeological Research At Fort Frederick, Maryland, pp. 22, ms.
  - 1971 Notes on East Barrack Test Excavation, July 1971, on file in the Maryland Geological Survey, Division of Archeology.
  - 1973 Photographs of Fort Frederick. Annotations for Photographs in the W. McCulloh Brown and George L. Schindel Collections. Copy negatives on file in the Maryland Geological Survey, Division of Archeology.
- Brumbaugh, Edwin G.
  - 1959 Fort Mifflin on Historic Mud Island in the Delaware River, Philadelphia, ms., Fine Arts Lib., U. of Pennsylvania, Philadelphia.
  - 1974 Personal Communication
- Bushnell, Robert R.
  1974 Personal Communication
- Cosans, Betty
  1974 Personal Communication
- Crozier, George W.
  - "A Report From Fort Frederick," "Inksherds, Newsletter of the Archaeological Society of Delaware, Volume XV, Number 1, September 1974, pp. 4-6.
- The Daily Mail Hagerstown, July 16, 1934, "Restoration Work at Old Fort Frederick Moves Along Nicely."
- The Daily Mail Hagerstown, August 14, 1934, Relics of Indian War Days
  1934 Found in Fort Frederick."
- Evening Globe Hagerstown, June 12, 1879, p. 4, "A Grape Harbor of Several Acres Covers Fort Frederick," Enoch Pratt Lib., Baltimore.
- Fox & Associates, Inc., Hagerstown, Maryland, 16 July 1973, Topographic Survey Map of Fort Frederick.

# References (cont'd.)

Grimm, Jacob L.

Archaeological Investigation of Fort Ligonier, Annals of Carnegie Museum, Vol. 42, pp. 186, Pittsburgh.

Hagerty, Gilbert

Letter, dated July 27, 1974.

Hughes, Samuel

Letter, Samuel Hughes, Hagerstown, to Gov. Thomas Johnson, January 15, 1778, on file: Executive Papers Box X, Folder 28, Maryland Hall of Records, Annapolis.

Hunter, William

"Forts on the Pennsylvania Frontier 1753-1758," <u>Pennsylvania</u>
Historical and Museum Commission, Harrisburg.

Kimmel, Ross M.

1973 Fort Frederick Restoration: Report on Historical Research,
Maryland Park Service, pp. 47, ms.

1974 Fort Frederick Restoration: Supplemental Report on Historical Research, Maryland Park Service, pp. 6, ms.

1974 Personal Communication

Letters dated: July 18th, November 15th and December 16th, 1974, also January 2, 3, and 8, 1973.

Kish, Emil J.

1974 Restoration and Development Drawings of Fort Frederick East and West Barracks, Unit I, 5 drawings, Maryland Department of Natural Resources, May 31, 1974.

1974. Personal Communication

Liesenbein, William

1975 Report on the Preliminary Archaeological Investigation of the Southwest and Northeast Bastions of Fort Frederick Conducted in October 1973, pp. 89, ms.

# References (cont'd.)

# Matthews, Earle D.

Soil Survey of Washington County, Maryland, United States
Department of Agriculture, Soil Conservation Service, Series
1959, No. 17, Maryland Agricultural Experiment Station, U.S.
Government Printing Office, Washington, D.C., October 1962,
pp. 136.

# Maxwell, Moreau S. and Lewis H. Binford

"Excavations at Fort Michilimackinac Machinac City, Michigan, 1959 Season," Publications of the Museum, Vol. 1, No. 1, East Lansing, Michigan State University, pp. 130.

# Noel Hume, Ivor

1969 A Guide to Artifacts of Colonial America, Alfred A Knopf,
New York.

# Porter, Charles W.

1936 Progress Report on Fort Frederick, SP-1, Maryland, Division of History, National Park Service, Washington, D.C., Typescript, ms.

# Reed, Washington, Jr.

1934 Archaeological Plan of Fort Frederick, National Park Service, University of Maryland and Maryland State Department of Forestry. Copy in the Maryland Geological Survey, Division of Archeology.

# Schindel, George L.

Narrative Report, Fort Frederick State Park #1, Big Pool,
Maryland, National Park Service, Washington, D.C., U.S. National Archives, Washington, D.C., Record Group 79, pp. 5.

1974 ... Personal Communication

# Stone, Garry W.

Letter to William Liesenbein, dated December 21, 1973, Mortar Sample Examination.

1974 Personal Communication

# Sword, Gerald J.

Letters dated: July 1, September 27, October 8th, 13th, and 29th, 1974.

FOUNDATION LOCATION

# BASE ELEVATIONS OF 1756 BARRACK FOUNDATIONS OBTAINED AUGUST 1974

EAST BARRACK

N FNDN WALL (TR A 6&7)	473.25'	
S FNDN WALL (TR B 1&2)	472.9'	
ELONGATED BRICK FEA (TR E & F)	474.05' (473.05?)	
	WEST BARRACK	
N FNDN WALL (TR A 6&7)	471.11" (?)	
W FNDN WALL (TR H)	470.9'	•
E FNDN WALL (TR H)	471.6'	
W FNDN WALL (TR C)	470.4'	
E FNDN WALL (TR C)	470.9'	
W FACE FP FOOTING (TR C)	470.6	
E FACE FP FOOTING (TR C)	470.6'	
W FNDN WALL (TR B) E FNDN WALL	470.4' 470.3'	
(TR B) W FNDN WALL	469.11'	
(TR A) E FNDN WALL	470.41	
(TR A) W FACE FP FOOTING	469.8'	
(TR A 2&3) E FACE FP FOOTING	469.6	
(TR A 2&3) S FNDN WALL (TR A 1&2)	469.9'	
DIAMD/OCTAGONAL BRICK FEATURE (TR A 9)	?	
STONE FNDN (TR B)	?	
STONE FNDN STAIR SUPPORT ( TR A 12 )	?	*FP=FIREPL

# TABLE II

- <sup>1</sup>Foundation corner readings (taken from barrack 1934 and 1973 tographic surveys and archaeological plans).
- <sup>2</sup>Center of foundation wall readings (taken from 1974 trenches).
- <sup>3</sup>Note, discrepancy between 1934 and 1973 topographic elevations. (Reed 1934 and Fox & Associates 1973).

# ELEVATIONS OF THE EAST AND WEST BARRACK FOUNDATIONS

N FNDN WALL (T) (TR B 6&7) S FNDN WALL (TR B 1&2) ELONGATED BRICK FEATURE (TR E & F)	FOUNDATION
(T) 474.25 <sup>2</sup> (B) 473.25 473.10 472.9	TOP AND BOTTOM ELEVATIONS OF REMNING 1756 FNDN OBTAINED AUG 1974
13"1,2 13"1,2 13" 4 13" 4 1 layer 4 of brick undisturbed?	REMNING 1756 FNDN HEIGHT OBTAINED AUG 1974
EAST BARRACK ELEVATIONS  13"  13"  473.7  1 layer 473.15  of brick undisturbed?	TOP ELEVATIONS OF STONE FNDN OBTAINED DEC 1934 BEFORE LANDSCAPING
(T) 475.01 (B) 474.25 474.5 473.10 474.05	LANDSCAPING AND NEW GRADE IN 1937 OBTAINED JULY 1973
7"2	HEIGHT OF 1935 CCC STONE CAPPING OBTAINED AUG 1974
20" <sup>2</sup> 20" 1 layer of brick	COMBINED 1756 FNDN AND 1935 CAPPING MODIFICATION HEIGHT OBTAINED AUG 1974

# WEST BARRACK ELEVATIONS

(TR A 12)	STAIR SUPPORT	STONE FUDN	(TR-B)	STONE FUDN	(TR A 9)	BRICK FEATR	DIAMD/OCTAGL	(TR A 1&2)	S FNDN WALL	(TR-A)	E FNDN WALL	(TR-A)	W FNDN WALL	(TR-B)	E FNDN WALL	(TR-B)	W FNDN WALL	(TR-C)	W FACE FP FNDN	(TR-C) *	E FNDN WALL	(TR-C)	W. FNDN WALL	(TR-H)	E FNDN WALL	(TR-H)	W FNDN WALL	(TR-A 687)	N FNDN WALL
	٠.	٠٠	•0	*>		*\	472.4	469.9	471.2	470.4	471.9	469.11	471.5	470.3	472.25	470.4	471.8	470.6	471.9	470.9	472.4	470.4	471.7	471.6	472.1	470.9	471.7	471.11	٠٧
		•>		*3			٠٧		17"		18"		14"		23"		16"		15"		19"		15"		7"		10"	destroyed	0"
		٠٧		•>			472.5	470.6	471.2		=		=		=		=		=		=	given	not		472.6		471.3	471.3	472.6
	470.8	473.2	472.0	473.8		472.4	473.11	471.2	473.3	471.9	473.5	471.5	473.5	472.25	473.8	471.8	473.9	471.9	473.6	472.4	473.8	471.7	473.9	472.1	474.0	471.7	474.0	471.11	474.0
		30"		20"			19"		25"		24"		24"		17"		26"		21"		15"		26"		23"		27"		25"
		30"		20"			19"		42"		42"		38"		40"		42"		36"		34"		41"		30"		37"		25"

•	1	·		
#5%+%-ww	SE-18HWHGF1K	TOTAL		
1 46444464	FORCELAIN JACKFIELD JACKFIELD (1745-1790) SCRATCH BLUE (1720-1760) PLAIN SALT GLAZE (1720-1760) DELFT (1650-1760) QUEENSWARE (1765-1785) PEARLWARE IRONSTONE STONEWARE SLIF EARTHENWARE GLASS WARES (1670-1860)	CERAMIC WARES		
F4 F4	<b>#</b> H H	INSIDE BARRACK CCC TOP SOIL BACKFILL OUTSIDE BARRACK CC	_ 14	
b) tht h	H	TOP SOIL BACKFILL CCC EXPLORATORY TRENCH BACKFILL	BAFRAOK	1974 F
	•			FORT
VI	нн <i>м</i> йн н	TOP SOIL CCC BACKFILL RED CRAVELLY CLAY CCC FILL		T FREDERICK
		YEL-CRN-ERN CLAY CCC BACKFILL CCC CONST. ROCK	·	18
<b>м</b> В н	ванн опн	& MORTAR RUBBLE THIN TO THICK BLK HUMUS-RUBBLE		excavations enlence
א אינו פא	מבע בבבע	MIXED BLK HUMUS		47
o <del>H</del>	₩ H	MOTTLED YEL-TAN		
ны		BRN GRAVEL & SHALE LENS		
μ. ω ដ <sub>N</sub>	H	TOP SOIL CCC BACKFILL	PROVENIENCE WEST BARRACK	
		RED GRAVELLY CLAY CCC FILL		
÷		YEL-ORG-BRN CLAY CCC BACKFILL		
13 25 This	64 640FH H HM	BRN LOAM, GRAV., SHALE OCCUP.LENS BLK HUNUS LENS		
Hω		BLK HUMUS LENS (FORMER GRADE)		
H		BLACK HUNUS & MORTAR LENS		
Ħ	Ħ	MIXED BLK HUNUS, E BEIGE TAN CLAY & RUBBLE		
1	· ·	i . '	1 1	Ī

# TABLE III

25 L	प्रमुप्तम्प्रम्	TOTAL	·
SQUARE NAILS & FRACMENTS HINGE FRACMENTS? BRICK (complete) BRICKS (HALF OR MORE) NORTAR (1756 & 20th Century) samples saved	IEAD GRAPE SHOT IRON CANNON BALL (6pd.,3½n dia) BRASS RAYROD GUIDE BRASS ESCUTCHEON PLATE BRASS BUTT PLAT FRAG. (musket?) CLASP KNIFE FRAGMENT FEWTER HANDLE KNIFE FRAGMENT LEAD STRIP FRAGMENTS BUILDING MATERIALS & HARDWARE	TEAD MUSKET BALLS (-71) LEAD MUSKET BALLS (A-1)	
8	H H	INSIDE BARRACK CCC TOP SOIL BACKFILL	
дμ		OUTSIDE BARRACK CCC TOP SOIL BACKFILL CCC EXPLORATORY TRENCH BACKFILL	1974
64		CCC EXPLORATORY TRENCH BACKFILL	
			FORT I
<u> </u>	н н	TOP SOIL CCC BACKFILL RED GRAVELLY CLAY CCC FILL	t frederick artifact fr
		YEL-CRN-ERN CLAY	₽
		YEL-CRN-PRN CLAY CCC BACKFILL CCC CONST. ROCK & MORTAR RUBBLE	EXCAVATIONS OVENIENCE
33	Ä	THIN TO THICK BLK HUMUS-RUBBLE	TIONS
127 8		MIXED BLK HUMUS S	
H		MOTTLED YEL-TAN E SANDY CLAY	
ю		BRN GRAVEL & HEST BOOK SHALE LENS HARRE ARE BACKFILL BACK BACKFILL	
1 7 %			
		CLAY CCC FILL	
Ы		YEL-ORG-BRIN CLAY E	
12, 16,		BRN LOAM, GRAV., SHALE OCCUP.LENS BLK HUMUS LENS	
<b>F</b>		(FORMER GRADE)	
		BLACK HUMUS & MORTAR LENS	
		MIXED BLK HUMUS, BEIGE TAN CLAY & RUBBLE	

TABLE III

# 1974 FORT FREDERICK EXCAVATIONS

# ARTIFACT FROVENIENCE

<u> </u>		POOLUME TO THE										
	PROVENIENCE  BAFRACK WEST BARRACK											
		INSIDE BARRACK EXC FEA TR-H OUTSIDE BARRACK	BKHOE TR-12									
TOTAL	PERSONAL ATTIRE & EFFECTS	TINSIDE BARRACK CO TOP SOIL BACKFILL OUTSIDE BARRACK C TOP SOIL BACKFILL CCC EXPLORATORY TRENCH BACKFILL CCC EXPLORATORY TOP SOIL CCC BACKFILL CCC BACKFILL CCC BACKFILL CCC CONST. ROCK & RUBBLE LENS WIXED BLK HUMUS & RUBBLE LENS WIXED BLK HUMUS BRIN GRAVEL & SAIDY CLAY SAIDY CLAY BRIN GRAVELLY CCC BACKFILL RED GRAVELLY CCC BACKFILL RED GRAVELLY CLAY CCC FILL YEL-ORC-BRIN CLAY CCC BACKFILL SHAL CORCUP. LENS SHALE OCCUP. LENS SHALE OCCUP. LENS BIX HUMUS LENS (FORNÆR GRADE) BLACK HUMUS & BLACK HUMUS &	MIXED BLK HUNUS, BEIGE TAN CLAY & RUBBLE									
	BONE COMB FRAGMENT BONE BRUSH BACK FRAGMENT CLOTH COVERED BONE BUTTONS UNFINISH BONE BUTTON BONE BUTTON PLAQUE FLAT DISC BRASS BUTTON FLAT DISC PEWTER BUTTON DONED DISC BRASS BUTTON FRAG. EMBOSSED FACE BRASS BUTTON FRAG. BRASS STRAIGHT PIN BRASS SHOE BUCCKLE FRAGMENTS KAOLIN BOWL & STEM PIPE FRAGS. BRASS JEW'S-HARP IRON NEEDLE ?											
l l l	MISCELLANEOUS 18TH CENTURY ITEMS  1723 ENGLISH HALFPENNY TWO-PRONGED FORK CULTIVATOR PLOW BLADE (1340 long) BRASS (UPHOLSTERY OR SADDLE) TACK											

TABLE III

# 1974 FORT FREDERICK EXCAVATIONS

# ERTIFACT 'EROVENIENCE

-		T			<u>·</u>	<del>,</del>	·	<del></del> -			<del></del>				<del></del> .					<del></del>	
					· ·	· <del>}</del>		·			· 	PR	OVEN	IENCE	: 	<del></del> -		<del></del>			.
· ·		E/ST	BARI			1						WE	ST B	ARRAC	K		٠				
		CCC	CCC			I	NSIDE	BAR	RACK		EXC :	FEA I	R-H		OUTS	SIDE	BARR	ACK		BKHOE TE	?-12
TOTAL	MISCELLANEOUS 18TH CENTURY ITEMS continued	INSIDE BARRACK CO TOP SOIL BACKFIIL	OUTSIDE BARRACK CCO TOP SOIL BACKFILL	CCC EXPLORATORY TRENCH BACKFILL		TOP SOIL CCC BACKFILL	RED GRAVELLY CLAY CCC FILL	YEL-ORN-BRN CLAY	CCC CONST. ROCK	THIN TO THICK BLK HUMUS-RUBBLE	MIXED BLK HUNUS & RUBBLE LENS		BRN GRAVEL & SHALE LENS	TOP SOIL CCC BACKFILL	RED GRAVELLY CLAY CCC FIIL	YEL-ORC-BRN CLAY	BRN LOAM, GRAV.,	BLK HUNUS LENS (FORMER GRADE)	BLACK HUNUS & MORTAR LENS	MIXED BLK HUNUS, BEICE TAN CLAY & RUBBLE	
111112831	TWISTED S-SHAPED IRON HOOK OBLONG IRON RING IRON RING (3½" dia.) BRASS (COLLAR OR BRASS) FRAG. IRON RIVET ? IRON FRAGMENTS: IRON WIRE FRAGMENTS SLAG WASTE OR GLASS BONE REFUSE  MISCELLANEOUS 20TH CENTURY ITEMS  22 CARTRIDGE SHELLS 12 GAUGE PAPER SHELL PITTED GLASS MARBIE 1940 U.S.A. PENNY GLASS CANNING JAR LID FRAG. CLEAR GLASS FRAG. (¼" thick) IRON BOLT WIRE NAILS STEEL STRAP BRASS TENT ROPE SLIDE ?	2° 1	<b>2</b> ° 18	1		1 1 3 1		1	3	90	1 1 1 1 5 3 B	1		6 6 1 1 22°	J		93			À	





# Plate Ia

A view looking NNW. Initial excavation of west barrack foundation. Note unevenness of ground grade. North curtain wall is in background. Photo taken 1933-1934. Maryland Geological Survey negative #485 A

# Plate Ib

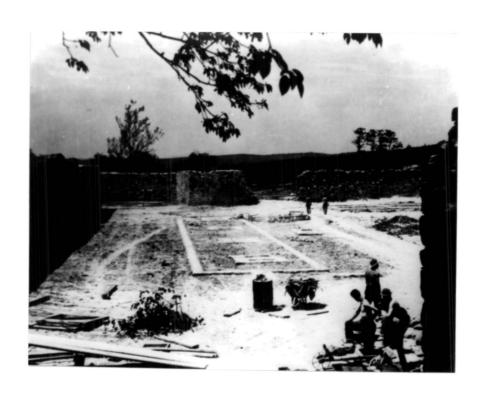
A view looking NNE. Foundation of west barrack being brought to new and level grade. North curtain wall is in background. Photo taken 1934-1935.

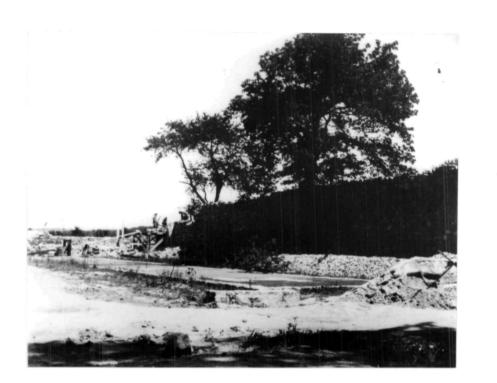
Maryland Geological Survey negative #448A

# Plate II

A view looking North. Foundation of west barrack brought to new and level grade and raised fill. Photo taken from within SW Bastion, NW Bastion and north curtain wall are in background. Photo taken 1935-1937.

Maryland Geological Survey negative #488A







# Plate IIIa

A view looking North. Foundation of east barrack being brought to grade. NE Bastion and east curtain wall are in background. Photo taken in 1934-1935.

Maryland Geological Survey negative #493 A

# Plate IIIB

A view looking North. Foundation of east barrack brought to new and level grade. NE Bastion, well and east curtain wall are in background.

Photo taken 1935-1936.

Maryland Geological Survey negative #450A





## Plate IVa

A view looking North. South Foundation wall of west barrack showing CCC's stone capping on top of the 1756 stone foundation. Note, 30 inch deep lenses of CCC raised fill. The 1756 foundation is distinguished by its soft, sand, lime, and earth matrix mortar and natural round stone.

Backhoe Trench A-1
Photo taken 1974 (Roll 8 Frame 10).

GSA-1, on sign board, reidentified as Backhoe Trench A-1.

# Plate IVa

A view looking west. West foundation wall of west barrack showing CCC stone capping on top of the 1756 stone foundation. Note, CCC modification of the foundation and 27 inch deep lenses of CCC raised fill. Trench B Photo taken 1974 (Roll 5 Frame 6).





# Plate Va

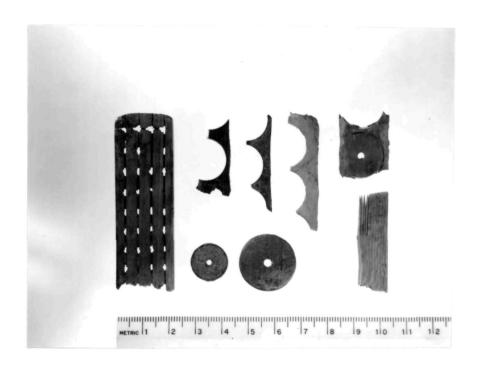
A view looking North. Excavated feature or storage area in north end of west barrack, 56 inch deep, showing stone and rubble fill. North foundation wall is in the background. Trench H.

Photo taken 1974 (Roll 11 Frame 17).

# Plate Vb

A view looking North. South foundation wall and fireplace footing of the east barrack showing 1756 stone foundation. Note, exterior trench abutting foundation and 10 to 12 inch CCC backfill. Backhoe Trench B-1 & 2. Photo taken 1974 (Roll 10 Frame 12).





# Plate VIa

A view looking south. Elongated insloping brick feature (possible drain). To the left is the west wall of the east barrack. On the right is the backfill of a CCC trench. Trenches E & F.

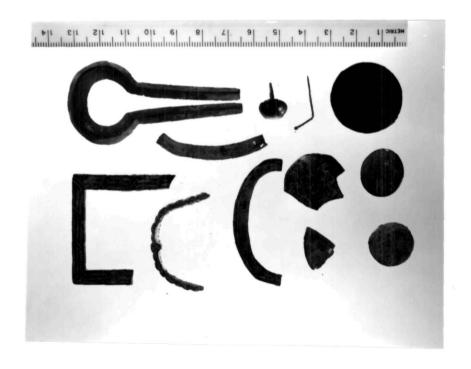
Photo taken 1974 (Roll 9 Frame 10).

Trench 6, on sign board, reidentified as Trenches E & F.

# Plate VIb

EAST AND WEST BARRACK ARTIFACTS: Brush Back Frag. bone, excavated feature; Top Row: Bone Button Plaque, excavated feature, Unfinished Bone Button Disk, black humus lens inside west barrack; Bottom Row: Cloth Covered Bone Buttons (disk drilled with auger), excavated feature and black humus lens inside west barrack; bone comb frag., occupation lens outside west barrack.



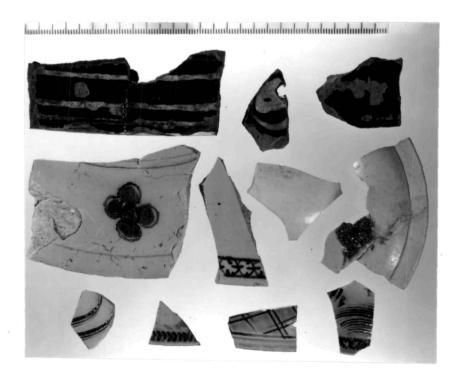


## Plate VIIa

EAST AND WEST BARRACK BRASS, PEWTER AND LEAD ARTIFACTS:
Top Row: Flat Disc Pewter Button and Embossed Face Brass Button,
excavated feature; Middle Row: Flat Disc Brass Button and Domed
Disc Brass Button, excavated feature, Brass Shoe Buckle frags.,
excavated feature, top soil east barrack and black humus lens
inside west barrakc; Bottom Row: 1723 English Halfpenny, occupation lens outside west barrack; Brass Straight Pin and Brass
Tack excavated feature; Brass Collar or Brace frag., and Jew's
Harp, excavated features.

#### Plate VIIb

EAST AND WEST BARRACK IRON, BRASS, PEWTER, LEAD AND GLASS ARTIFACTS: Top Row: Pewter Knife Handle frag., black humus lens inside west barrack; caste brass tent rope slide? (3 1/2" long), gravelly clay fill inside west barrack; middle row: Clasp Knife frag., occupation lens outside west barrack; Brass Ramrod Guide, occupation lens outside west barrack; Glass Vial Base frag., CCC trench fill east barrack; Bottom Row: Brass Butt Plate frag., occupation lens outside west barrack; Brass Escutcheon Plate, top soil inside east barrack; Lead Musket Balls, excavated feature and top soil inside west barrack; Lead Grape Shot, top soil inside west barrack; Glass Vial Base frag., occupation lens outside west barrack.



# Plate VIII

EAST AND WEST BARRACK CERAMIC ARTIFACTS:
Top Row: Scratch Blue Rimsherds, excavated feature,
black humus lens inside west barrack and occupation lens outside
of west barrack; Middle Row: Saltglaze Bowl Lid sherd, disturbed
black humus and tan clay lens outside west barrack; Creamware
rimsherd, top soil inside west barrack; Delft rimsherds, top
soil inside west barrack and occupation lens outside west
barrack and occupation lens outside west barrack, top soil
inside west barrack and excavated feature.

